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| 09/904,111 | 07/11/2001 | Ansaf Ibrahim Alrabady | TRW(TE)5685 | 1062 |
| 26294 | 7590 | 04/06/2005 | EXAMINER | |
| TAROLLI, SUNDHEIM, COVELL & TUMMINO L.L.P. 526 SUPERIOR AVENUE, SUITE 1111 CLEVEVLAND, OH 44114 | | | BANGACHON, WILLIAM L | |
| | | | ART UNIT | PAPER NUMBER |
| | | | 2635 | |

DATE MAILED: 04/06/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/904,111

Applicant(s)

ALRABADY, ANSAF IBRAHEM

Examiner

William Bangachon

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 November 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 16-28 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 16-28 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 11 July 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims 16-28 have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

4. Claims 16-19, 22-23, and 28, are rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,109,221 (Lambropoulos et al) in view of USP 5,712,638 (Issa).

In claims 16 and 28, Lambropoulos teach of an arrangement for remotely controlling convenience functions of a vehicle recited in the claims, comprising:

a portable transmitter (as shown in figure 1A) for transmitting remote convenience function request signals and a plurality of programmable vehicle-based receivers (as shown in figure 1), each one of the plurality of vehicles including an associated one of the plurality of vehicle-based receivers, each vehicle-based receiver having an associated identification and being configured to receive remote convenience function request signals, each vehicle-based receiver being responsive to receipt of a remote convenience function request signal including its associated identification for controlling performance of a requested convenience function {col. 23, lines 27+}

Although Lambropoulos teach of a portable transmitter, Lambropoulos does not disclose expressly "the portable transmitter including a memory in which is stored the associated identification of each of the plurality of vehicle-based receivers, the portable transmitter including means for selecting an associated identification of one of the plurality of vehicle-based receivers for which to include in remote convenience function signals to be transmitted", as claimed. In this case, Issa, in the same field of endeavor (vehicle remote control) is relied upon to teach a programmable multiple channel group transmitter for controlling multiple vehicles, wherein each vehicle having a security system {Issa, col. 4, lines 45+}. The transmitter employs an EEPROM 3 to store the identification or security codes for the different vehicle security system to be controlled {Issa, col. 5, lines 46+}. Issa teaches that a programmable multiple channel group transmitter is beneficial because **it does not require a vehicle operator to carry**

multiple transmitters in order to operate several vehicles {Issa, col. 4, lines 48-58}.

Obviously, this feature, when combined in the portable transmitter of Lambropoulos, is beneficial in the system of Lambropoulos (as taught by Issa). Therefore, it would have been obvious to one of ordinary skill in the art to combine the transmitter of Issa in the system of Lambropoulos because it is beneficial to not require vehicle operators to carry multiple transmitters in order to operate several vehicles, as taught by Issa.

In claims 17 and 22-23, the arrangement of claim 16 wherein the means for selecting an associated identification includes a pushbutton switch {Lambropoulos; fig. 1A, 12, 14, 16; Issa, col. 4, lines 26-31}, actuation of the pushbutton switch selecting the associated identification to be included in the remote convenience function signals {Lambropoulos; shown in figure 1B}.

In claims 18 and 19, the arrangement of claim 16 further including a plurality of operations systems, each one of the plurality of vehicle-based receivers having an associated one of the plurality of operations systems, each of the plurality of operations systems being configured to perform a convenience function, each vehicle-based receiver, in response to receiving a remote convenience function request signal including its associated identification, controlling its associated operations system to perform changing a locked condition of a vehicle door {Lambropoulos; col. 8, lines 65+}.

5. Claims 20 and 24-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,109,221 (Lambropoulos et al) in view of USP 5,712,638 (Issa), and further in view of USP 5,898,397 (Murray).

With regards to claims 20, 24-27, Lambropoulos in view of Issa does not disclose encryption and decryption, as claimed. In this case, Murray is relied upon to teach of a rolling or hopping code encryption {Murray, col. 3, lines 50-55} having a prestored I.D. code 122, a programmable I.D. code or an I.D. code set by discrete switches, a code key transmitter may also utilize rolling code or code hopping encryption as shown in FIG. 11. In such a remote keyless entry system, a microcontroller 130 communicates with a memory 132, which stores a unique transmitter serial number, a unique manufacturer key and a counter value 134. When activated by a user manipulatable switch 136, the microcontroller 130, as is conventional, executes a proprietary, non-linear algorithm utilizing the serial number, the manufacturer key and the counter value to generate an output signal, which is transmitted by a transmitter element 138 to the receiver. The transmitter counter advances incrementally upon each activation of the transmitter switch 136. (41) Similarly, the receiver includes a counter which increments once for each valid transmitter signal that is received by the receiver. The receiver also executes a non-linear algorithm to decode the transmitted signal to reconstruct the transmitter counter value, the manufacturer key, and the serial number transmitted from the rolling code transmitter 128. When the serial numbers match and the transmitter counter values are identical or within a prescribed, allowable numeric range, the receiver will generate an output signal to a control device to open a vehicle door lock

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{Murray, figure 11; col. 9, lines 26+}. The rolling code encryption and decryption system of Murray would have been obvious in the system of Lambropoulos because it provides security and adaptability to conventional and smart security systems, to one of ordinary skill in the art.

6. Claim 21 is rejected under 35 U.S.C. 103(a) as being unpatentable over USP 5,109,221 (Lambropoulos et al) in view of USP 5,712,638 (Issa), and further in view of USP 6,259,362 (Lin).

In claim 21, Lambropoulos in view of Issa does not disclose "a vehicle-based transceiver that further includes a vehicle-based transmitter for transmitting a feedback signal, the portable transmitter being part of a portable transceiver that includes a receiver portion for receiving the feedback signal, the portable transceiver further including a display for indicating receipt of the feedback signal". In this case, Lin is relied upon to teach of a portable transceiver (14) comprising a display (68) for indicating vehicle status such as status of door locks (remote convenience devices), alarm system {Lin, col. 2, lines 55-65; col. 4, lines 45-53; col. 6, lines 11-21}. Obviously, a display incorporated in a portable transmitter, as taught by Lin, would have been obvious in the system of Lambropoulos because it provides a visual check of the vehicle system of Lambropoulos, to one of ordinary skill in the art. Not only would it be very beneficial to handicapped drivers, such as deaf drivers, but also to any driver who would otherwise be double-checking whether the doors are closed or that the alarm is working properly.

Conclusion

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

USP 5,937,065 (Simon et al) is cited in that it teaches of bi-directional communication of encrypted and decrypted signals in a keyless motor vehicle entry system {see whole document}.

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Examiner Contact Information

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to William Bangachon whose telephone number is 703-305-2701. The examiner can normally be reached on 4/4/10.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Horabik can be reached on 703-305-4704. The fax phone numbers for the organization where this application or proceeding is assigned is 703-872-9314 for regular and After Final formal communications. The examiner's fax number is 703-746-6071 for informal communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-4700.

William L Bangachon
Examiner
Art Unit 2635

April 4, 2005

MICHAEL HORABIK
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2800

